



with the senice regards of

DWELLINGS OF THE SAGA-TIME

1N

ICELAND, GREENLAND, AND VINELAND

ВΥ

CORNELIA HORSFORD

[Reprinted from The National Geographic Magazine, Vol. 1X, No. 3, March, 1898]

washington, d. c.
judd & detweiler, printers
1898

=

DWELLINGS OF THE SAGA-TIME IN ICELAND, GREENLAND, AND VINELAND

ву

Cornelia Horsford

The Saga-time began with the colonization of Iceland in 875 and lasted for about 150 years. During this time the oft-repeated accounts of the discovery, colonization, and early history of Iceland, as well as that of all Seandinavia, acquired the form of Sagas or narrations. Ari Thorgilsson, the historian, who was born in Iceland in 1067 and died in 1148, was the first to write down these events in chronological order. In each of the four books attributed to this writer Greenland and Vineland are briefly mentioned.* Other Sagas relate the adventures, tragedies, and family histories of the colonists, and among these are the Sagas which tell about Greenland and Vineland.†

We know that Scandinavia has been a rich field for collecting relics of the stone, bronze, and early iron ages, but no ruin of a dwelling dating from the Saga-time has yet been identified in Denmark, Sweden, or Norway. This may be due to the lack of durability in the way of building the houses and to the custom of using over and over again in new buildings all the suitable material from the old walls.

In 1888 a young Icelander named Valtýr Gudmundsson, who was studying for the degree of Doctor of Philosophy at the Uni-

^{*}Islendingabók, Landnamabók, Kri*tni-Saga, and Konungabók.

[†]Hauksbók, Eiríks Suga Rauthi, and Flateyjarbók. Greenland and Vineland are also briefly mentioned in the Fornmanna Sögur, Eyrbyggja Suga, and in three vellum manuscripts in the Arna-Magnean Library at Copenhagen. An account of these will be found in the first chapter of "The Finding of Wineland the Good," by Arthur Middleton Reeves. London, 1890, Henry Frowde.

versity of Copenhagen, chose for the subject of his thesis "Private Dwellings in Iceland in the Saga-time." In preparing for this he read every saga of his native literature, comparing each description, sentence, and word relating to his subject, until in imagination he had reconstructed every form of dwelling and outhouse of the Saga-days. These buildings differed considerably from the design given by Finsen in his edition of Gunnlaug's Saga, printed in 1775, which was the accepted model until the publication of Dr Gudmundsson's work.

In 1894 Lieutenant Daniel Brunn, of the Danish navy, was sent by the Danish government to make extended researches among the Norse ruins in Greenland. These researches went far toward confirming the results of Dr Gudmundsson's studies.

It was therefore with much gratification that Dr Gudmundsson (who was by that time professor of Old Norse literature and history at the University of Copenhagen) accepted my commission to direct archeological researches for me among the ruined dwellings and other works of man in Icoland during the summer season of 1895.† He took with him from Copenhagen another Icelander named Thorsteinn Erlingsson, and to him the greater part of the work is to be accredited, for Dr Gudmundsson was in attendance at the Icelandic Parliament and could not be present in the field himself.

1CELAND

The Icelandic Antiquarian Society has done some good work in the field. They have identified and roughly measured the ruins of many historical farms and of several hundred booths at some of the old open-air law courts called "things." One or two pagan temples have been dug out and carefully described, and many burial mounds, which also belonged to the pagan days. The ancient dwellings were situated on sloping ground, near rivers or fjords.

From the early days this has been believed to be the ruin of the house built by Erik the Red in the Hawk River valley soon after his marriage with Thorhild, and here his eldest son Leif was probably born. Erik lived in four different places in Ice-

^{* &}quot;Privatboligen pår Island i Saga-Tiden " af Valtyr Gudmundsson. Copenhagen, 1889. Andr. Fred. Host & Sons, Forlag.

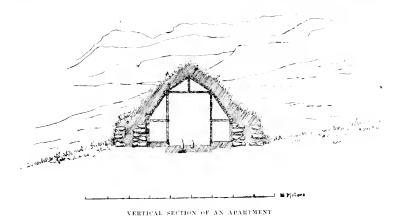
[†]The report of this expedition will soon be published by the Viking Club of London under the title of "Ruins of the Saga-Time,"

[†]The researches of this society are published yearly at Reykjavík, Iceland, in the "Árbók hins Islenzka Fornleifafélags."



SUPPOSED BIRTHPLACE OF LEIT LRIKSON

land before he finally settled in Greenland. The supposed ruins of his houses on Öxney and Sudrey can still be seen also,* but I do not know that any ruins have been identified at Drangar. The ruins of these dwellings, when undisturbed, are low, grassgrown ridges and hollows often difficult to detect, except when stones protrude through the turf. A dwelling usually consisted



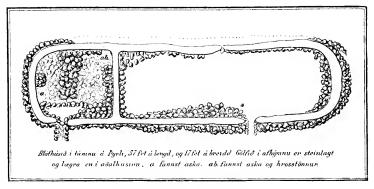
of three apartments: a hall or principal room, in which there was always a fireplace; a sitting-room for the women, and a store-room or pantry.† These apartments were like small houses,

^{*&}quot; Finding of Wineland the Good," by A. M. Reeves, p. 165.

^{†&}quot; Fortidsminder og Nutidshjem påa Island" of Daniel Brunn. Copenhagen, Ernst Bojesen, p. 161.

each with a separate roof, but attached to each other, with passages through the thick walls. Near by were usually one or more small outhouses. These dwellings were built on the surface of the ground, which was probably levelled when necessary. The floor was of firmly beaten earth.

The walls were one and a half meters thick and from one to one and a half meters high. The inner side was built of unhewn stones and the interstices were filled with earth. The outer side was of alternate layers of turf and stones, and the space between the two sides was filled in with earth kneaded hard. When these walls fall, the stones necessarily slip down on either side, and the bottom row with the space between remains almost intact, unless



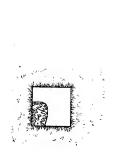
RUIN OF PAGAN TEMPLE AT THYRLI

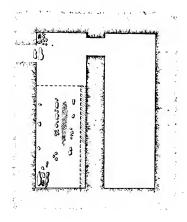
Árbók Ilins Íslenzka Fornleifafelags, 1880-1881

unnaturally disturbed. Often, however, the walls were built entirely of layers of turf or with only disconnected rows of stones at the base.

The drawing of the pagan temple at Thyrli shows the manner of laying the inner and outer sides of a wall with the earth between the two. A large stone, of course, extends farther back into this earth between than a small one does.

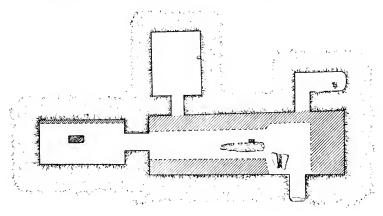
The inside measurement of a hall varied from 3 to 7 meters in width and from 10 to 17 meters in length. The plan is of the ruin of Erik the Red's house, shown above from a photograph. A long narrow fire-place usually extended through the middle of the room. This was either paved or surrounded with stones standing on edge, and was about 3 meters long and from 60 to 80 centimeters broad. Besides the long fire which served to warm and light the hall, there was a small cooking fire made in the same way, about 1 meter square and raised a few centimeters





PLAN OF THE ROUSE OF ERIK THE RED IN HAUKADALE

above the level of the floor. Other non-essential forms of fireplace I need not describe here. A separate apartment was often formed by erecting a thin partition across a room, as is shown in this plan by the dotted line. Pavements, but more often thresholds made of one or more long stone slabs, were sometimes in the doorways and also in the passages through the thick walls between the apartments. The outhouse shown at the



RUIN OF SÁMSSTAÐIR IN HIGÓRSÁRÐALR

left was about 13 meters from the door of the house, on the steep mountain side. It was 4 meters square, built of turf only, and partially underground. There was a large square platform of stones in one corner which had served for a fire-place.

Narrow platforms of earth faced along the outer edge with upright stones, on which the inhabitants both sat and slept, extended along one or both sides of the hall. In the large halls these platforms were about 23 centimeters high and 11 meters broad. Sometimes there was also a broader platform at one end of the hall. Sámsstadir is one of the farmsteads in the Thor's River valley which was buried during an eruption of Mount Hecla in the fourteenth century. This valley is called the Pompeii of Iceland. The farm was probably abandoned about 1300. It shows the first change in the evolution toward thicker walls.

With the exception of some spinning-stones, which were found in the sitting-room of a house not shown here, no relies were found during these researches. It is also an interesting fact that no runic inscription belonging to the Saga-time or for two centuries later has yet been found in Iceland.

The evolution which has taken place in house-building since the Saga-time has been in the steady increase in the thickness of the walls until their breadth is nearly doubled, a slight increase in height, not admitting a second story under the roof, and the addition of many apartments, so that from a distance the many roofs of a farmstead look almost like a little village.

GREENLAND

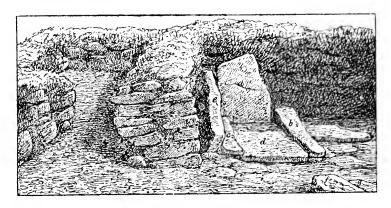
Greenland was discovered and colonized by Erik Thorvaldsson toward the end of the tenth century, and from that time two Norse colonies, called respectively the eastern and the western settlements, prospered for about three hundred years. The ruins of these two settlements have been studied with more or less care by the Danish government. In the eastern settlement a hundred and fifty farms, with all their outbuildings, have been surveyed and measured. A few dwelling-houses have been thoroughly dug out and examined.*

^{*}Beskrivelse af Ruiner i Julianchaabs Distrikt i Aaret 1880, af G. F. Holm. Meddelelser om Grönland, udgivne af Commissionen for Ledelsen af de geologiske og geographiske Undersögelser i Grönland. Copenhagen, 1883, vol. vi.

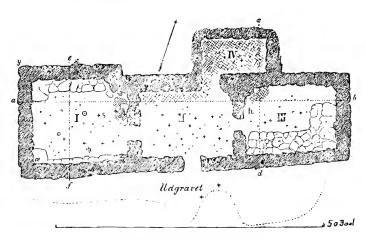
Undersogelse af Grönlands Vestkyst fra 64° til 67° N. B. af J. A. D. Jensen, 1884 off 1885. Meddelelser om Grönland. Copenhagen, 1889, vol. viii,

Arkæologiske Undersögelser i Julianehaabs Distrikt af Daniel Brunn, 1895. Meddelelser om Grönland. Copenhagen, 1896, vol. xvi.

As in Iceland, these farmsteads were situated on the shores of rivers and fjords. Although in the main they resemble those of Iceland, one is impressed at once with certain striking differences. Even the undisturbed ruins suggest narrower, straighter, and stronger walls.



WALLS OF A NORSE RUIN IN GREENLAND Meddelelser om Grönland, vol. xvi. Daniel Brunn

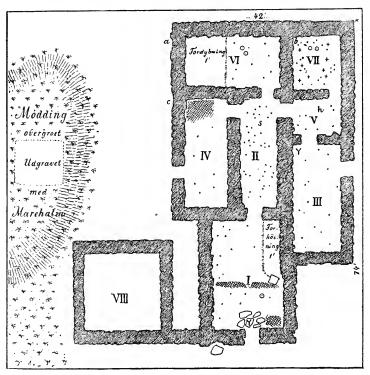


PLAN OF A NORSE RUIN IN GREENLAND

Meddelelser om Grönland, vol. xvi. Daniel Brunn

The dwellings were usually long and narrow, consisting of from three to eight rooms, and were surrounded by numerous outhouses and stables for cattle, sheep, and goats. Close to the houses are found enormous midden heaps, often larger than the ruins of the houses themselves. The walls were narrower than the Icelandic walls, and, although they were built of layers of turf and stone or sometimes of turf on a foundation of stone, the middle space, filled in with earth, had almost disappeared, as may be seen in the sketch. The long platforms of stone along the walls, the pavements, thresholds, and scattered fireplaces recall similar constructions in Iceland.

In 1261 Greenland became subject to the Crown of Norway, and to this influence the Danes attribute certain differences be-



Supposed site of the house of erik the red in greenland Meddelelser om Grönland, vol. xvi. Daniel Brunn

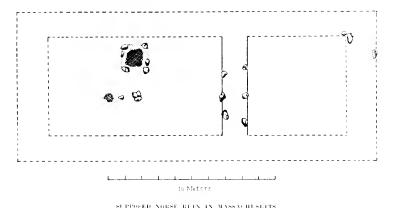
tween the customs of the Norsemen in Iceland and in Greenland, which I need not describe here.* Perhaps the difference in architecture is due to the same cause. The ruin of the house found on the supposed site of Brattahlid, the abode of Erik the Red, looks as if it might have been remodeled several times since that fearless Norseman first settled in the land.

^{*} Meddelelser om Gronland, vol. xvi, p. 490,

Numerous relics have been found in these ruins—iron nails and knives, pieces of stone vessels, spinning stones, bone combs, and stone pendants bored with holes and incised with rune-like but illegible characters. These, like all the ruins in Greenland which have been thoroughly dug out, are attributed by the Danes to a period later than the Saga time.

VINELAND

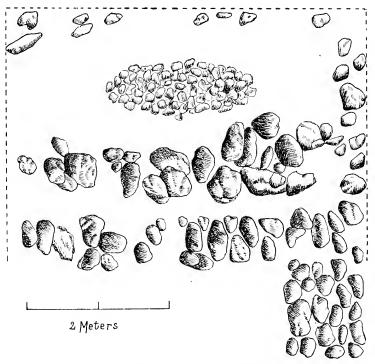
The ruins, found where one had every reason to hope to find traces of the houses built in Vineland by Leif Erikson and his followers, did not differ in their essential features from those of Iceland in the Saga-time. The situations were similar. The walls were laid in the same way and were of the same thickness, and the fireplaces were constructed as they were in the habit of constructing them at home.



The walls of this house can be little more than suggested. They were probably built almost entirely of turf, and they looked as if they might have been intentionally destroyed. I show it for its fireplace. Three or four fireplaces were on the site, one of them being the familiar Indian clam-bake, with its neatly paved, saucer-shaped hearth piled with ashes and unopened clam shells, for this temptingly prepared feast had never been eaten. One of these fireplaces, however, was very different from the others, and of the Icelandic type, with its surrounding upright stones at the four corners and a mass of charcoal and stones inside. This house is one of those on the place pointed out in Cambridge by my father, Eben Norton Horsford, as the site of

the group of houses built by the party of Thorfinn Karlsefni in Vineland.

The second house I show for the construction of the walls and the little pavement, presumably at the door, which resembles that in the temple at Thyrli shown before. The outer side of the wall contained only one layer of stones, the inner, according to custom, containing more and larger stones, some of which had fallen in. The oblong platform of small stones occupied the place of



SUPPOSED NORSE RUIN IN MASSACHUSETTS

and resembled a fireplace, but showed no trace of such use, unless in the dark sticky earth between and under the stones, which I have since been told may have been ashes absorbed in the soil. This house, with the other ruins near it, are about ten or more miles from the settlement at Cambridge, and so far from the river that it must be attributed to later visitors from the North than those told about in the Vineland Sagas.

No relics have been found at either of these sites which I attribute to the Northmen. I have, however, one stone implement, which was found imbedded in the yellow sand and seemed to have been lost before the advent of the Northmen, and presumably belonged to the savages they found here.

Probably the reader will contrast these different dwellings of the Northmen with those of the native tribes of North America, from the magnificent ruins of Copan to the long, narrow houses of the Iroquois, and will detect the similarities and differences between these and the habitations of the Greenland Eskimos.

The Spanish, Dutch, French, and English explorers visited and might have built houses on these shores, but in Europe no houses of this type are found outside of Iceland, except in the Faroes, and, although ruins of Norse dwellings are probably awaiting detection in England, Scotland, Orkney, and Shetland, they have not yet been brought to the notice of archeologists.*

The earliest examples of architecture on our shores, as well as the present knowledge of the evolution of European architecture, as far as I have been able to find out, show that the walls of the inferior houses in post-Columbian times were unlike those of Iceland. Our oldest French house is the Sillery manor house near Quebec, built by the Jesuits in 1637. The walls of this house are built of stone, and are three feet thick, laid in mortar which is now nearly as hard as the stone itself. I have been unable to find anything more primitive of French workmanship here. I have found nothing in English work which is not familiar to you all, although I have followed up several mistaken reports. The Dutch buildings show an equally advanced though different type of development, and also the Spanish.

I am glad to have an opportunity to express publicly my sincere thanks and deep indebtedness to the American archeologists, both here and in Canada, who have come most kindly to my assistance and taught me in the field the knowledge they had acquired by their own experience, without which I could not have learned how to gather many facts, a few of which I have here presented.

Mr Gerard Fowke: Seven weeks of field work in and near Cambridge. Two weeks of field work in Ohio, Pennsylvania, West Virginia, and Maryland, 1894. Five weeks in Cambridge, 1896.

DR FRANZ BOAS: Two days in and near Cambridge, 1894.

MR DAVID BOYLE, Curator of the Canadian Institute at Toronto: One week in and near Cambridge. One week in Ontario, Canada, 1894. One week in Cambridge, 1896.

^{*}Since writing this I have been notified that ancient Norse ruins have been found in the Hobrides.

Mr. F. W. Norris, *Hon. Editor of the Viking Club, London:* One week in Cornwall, 1895. Three weeks in Scotland, Orkney, and Shetland, 1896. Two weeks in England, 1897.

DR PHIL. VALTYR GUDMUNDSSON, Professor of Old Norse History and Literature at the University of Copenhagen: Direction of explorations in Iceland for four months, 1895. Five weeks in and near Cambridge, 1896.

Mr Thorsteinn Erlingsson, Iceland: Four months in Iceland, 1895.

REV. HENRY OTIS THAYER, Maine Historical Society: Two weeks among old English ruins in Maine, 1896.

Sir James Lemonne, Past President of the Royal Society of Canada: Direction of researches near Quebec, 1896.

Mr.C. C. Willoughby, *Peabody Museum*, *Cambridge*: Two days on Cape Cod, 1897.

Mr W J McGee: Advice, criticism, and encouragement, both in Washington and Cambridge for over four years.











